

ABSTRACT OF THE DISCLOSURE

An imaging unit including a pair of objective lens systems and an imaging device that photoelectrically converts optical images into image signals is incorporated in the distal portion of an endoscope. The pair of objective lens systems is arranged to pick up images while viewing an object from different viewing points. Optical images having traveled through the objective lens systems are converged on the imaging device. A camera control unit converts image signals, which result from photoelectric conversion performed by the imaging device, into video signals according to which images are displayed on a monitor. A video capture circuit converts the produced video signals into digital image signals. A host computer performs arithmetic operations using the resultant digital image signals. A desired cutting plane is designated using the reference image displayed on the monitor, whereby section information concerning a viewer's desired section determined with the cutting plane can be acquired.